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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/653,176	09/03/2003	Byeong Yong Lee	7989.011.00-US	3030
30827	7590	03/29/2006		EXAMINER
				LEUNG, PHILIP H
			ART UNIT	PAPER NUMBER
			3742	

DATE MAILED: 03/29/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/653,176	LEE ET AL.	
	Examiner Philip H. Leung	Art Unit 3742	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) Responsive to communication(s) filed on 09 March 2006.

2a) This action is FINAL. 2b) This action is non-final.

3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) Claim(s) 1,2,4-7 and 10 is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5) Claim(s) _____ is/are allowed.

6) Claim(s) 1,2,4-7 and 10 is/are rejected.

7) Claim(s) _____ is/are objected to.

8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) The specification is objected to by the Examiner.

10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) Notice of References Cited (PTO-892)
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
 Paper No(s)/Mail Date 3-9-2006.

4) Interview Summary (PTO-413)
 Paper No(s)/Mail Date. _____.
 5) Notice of Informal Patent Application (PTO-152)
 6) Other: _____.

DETAILED ACTION

1. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

2. Claims 2 and 5-7 and 10 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over Claims 12, 17, 18 and 22 of the copending divisional Application No. 10/981,574. Although the conflicting claims are not identical, they are not patentably distinct from each other because the claims as amended in the two applications are both directed to a combined microwave oven with a toaster comprising a heater, input for selecting a toaster function defining the food type and desired toasting level, a memory storing a voltage level as a function of the heater and the toaster function, a temperature sensor for sensing the inside of the toaster, a time counter for measuring the amount of time that has elapsed since the previous toaster operation and a microcomputer for controlling a heating time period by combining a first, a seconds and a third time period (compare, claim 2 with claim 12 of the divisional application). Similarly, the method recited in claims 5-7 and 10 are also directed to a method of operating a combined toaster and a microwave oven having substantially

the same steps as claimed in claims 17, 18 and 22 of the divisional application. In view of the overlapping subject matter as now claimed in this application and the parent application, the species election requirement mailed 9-10-2004 is hereby withdrawn.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

3. Again, it is respectfully reminded that a line of demarcation must be maintained between this application and its divisional application Serial No. 10/981574.

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 1 and 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Admitted Prior Art as shown in Figure 2 (APA), in view of Hara (JP 6-141982) (newly cited) or Wanat et al (US 5,802,957) and further in view of Devlin (US 5,126,536) (both previously cited).

The Admitted Prior Art as shown in Figure 2 and discussed in paragraphs [0008]-[0014] shows a microwave oven with a toaster including “a control panel 26 in an upper part of front surface of the cavity door 24, provided with a first selection part 26a for selecting functions of the microwave oven, and a second selection part 26b for selecting a toaster function, and a display part 26c for displaying an operation state for a key input at the first selection part 26a or

the second selection part 26b". Therefore APA carries out "a function of a signal received from the first or second selection part 26a or 26b of the control panel 26, for setting a toasting time period related to a kind of bread and a level of bread toasting the user selected". APA does not show the use of a temperature sensor for controlling the time of toasting according to the inside temperature of the toaster chamber. Hara shows a toaster having a controller, which controls the toasting time according to the temperature and the elapsed time since the end of previous toasting (see all the Figures and the English abstract). Wanat also shows that it is well known in art of toasters to use a thermal sensor (76) positioned at the toaster chamber 30 to adjust the length of the toasting cycle to compensate the varying temperature in the toasting chamber with the use of a processor unit 70 (see Figures 3 and 4, col. 2, line 54 – col. 3, line 20 and col. 6, line 37 – col. 7, line 20). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify APA to position a thermal sensor in the toaster chamber to monitor the temperature of the toaster chamber to determine the total toasting time period taking the toaster function and the toaster chamber temperature into consideration for better heating control to achieve a better toasted product, in view of the teaching of Hara or Wanat. Consequently, Admitted Prior Art (APA) combined with Hara or Wanat shows every feature as claimed except that it does not explicitly show that the level is a voltage level for the resistance heater of the toaster. Devlin shows that it is well known in the art of electrical toasters to set the degree of toasting by adjusting the voltage level of the resistance heaters (see Figures 1-4, col. 6, line 27 – col. 7, line 2 and col. 9, lines 37-52). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify APA combined with Hara or Wanat to set voltage level of the resistance heaters of the toaster to adjust the toasting level which is a factor of the total

toasting time according to the user's preference, in view of the teaching of Devlin. Therefore, the microprocessor of the toaster is controlled to have a total toasting time according to all these factors: toaster, function, inside temperature and the voltage level according to the combined teachings of all these references. To separately determine different heating periods before combine them into a total resultant time period would have been a mere intermediate step of programming the control method but adds little patentability weight to the claimed combined toaster and microwave oven.

6. Claims 2, 5-7 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Admitted Prior Art as shown in Figure 2 (APA), in view of Hara (JP 6-141982) or Wanat et al (US 5,802,957) and Devlin (US 5,126,536), as applied to claims and 1 and 4 above, and further in view of Lanno et al (US 5,128,521) (newly cited).

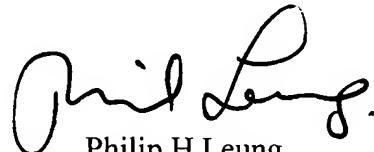
As set forth above, the Admitted Prior Art (APA) combined with Hara or Wanat and with Devlin shows every feature as claimed except for the use of a time counter for measuring the elapsed time period from the end of the last operation of the toaster. Lanno shows a toaster with a microcomputer controller for controlling the degree of toasting according to the color of the toast (toast levels), kind of cooking and a time counter to measure the elapsed time between the end of the previous cycle and the beginning of the new cycle (see the abstract and Figure 1 and the program flowcharts as set forth in Figures 2-12). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify APA as modified above to control the toasting operation according to the kind, the toast voltage level and the time elapsed between toasting operation for better toasting control and result, in view of the teaching of Lanno.

7. Applicant's arguments have been considered but are moot in view of the new ground(s) of rejection.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Philip H Leung whose telephone number is (571) 272-4782.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robin Evans can be reached on (571) 472-4777. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Philip H Leung
Primary Examiner
Art Unit 3742

P.Leung/pl
3-24-2006